# Examiner's report
## Financial Management (FM)
## September 2018

**General comments**
The Financial Management exam is offered in both computer-based (CBE) and paper-based (PBE) formats. The structure is the same in both formats, but the CBE exam delivery model means that candidates do not all receive the same set of questions. In this report, the examining team share observations from the marking process, highlight strengths and weaknesses in candidates' performance, and offer constructive advice for future candidates.

- Section A objective test questions – we focus on two specific questions that caused difficulty in this sitting of the exam
- Section B case-based objective test questions – here we look at the strengths and weaknesses in specific syllabus areas
- Section C constructed response questions - here we provide commentary around some of the main themes that have affected candidates' performance in this section of the exam, identifying common knowledge gaps and offering guidance on where exam technique could be improved, including in the use of the CBE functionality in answering these questions.

Congratulations to those candidates who were successful in this examination diet. If you were not successful, I hope that you will study the content of this report carefully as part of your preparation for your next attempt.

Performance in the September 2018 examination diet was, on the whole, good and there were some very good individual performances. By contrast, there are candidates who are simply not prepared for an examination in Financial Management at this level. It is worth re-emphasising that candidates sitting this examination must study the whole of the syllabus to prepare themselves adequately for this test of Financial Management skills.

Furthermore, in Section C of the examination, candidates are expected to not only perform calculations but to demonstrate knowledge in a discursive manner, typically through being asked to 'Discuss' or 'Explain' Financial Management concepts. This requires good preparation for the examination through dedicated study, and then being able to apply such knowledge to the scenarios presented in Section C questions.

Overall, candidates were well prepared in some areas of the syllabus, in particular those that have featured regularly such as calculating the nominal net present value of an investment project, but less well prepared in others such as 'Adjusting for risk and uncertainty in investment appraisal' and 'Specific investment decisions'.

**Section A**

The objective test questions in Section A aim for a broad coverage of the syllabus, and so all areas of the syllabus need to be carefully studied. Candidates preparing for the examination are therefore advised to work through as many practice objective test questions as possible, reviewing carefully how correct answers were derived in any areas where they have uncertainty.

The following questions are reviewed with the aim of giving future candidates an indication of the types of questions asked and guidance on dealing with such exam questions.

Example 1 is numerical and tests understanding of sensitivity analysis.

Example 2 is a question testing knowledge of strong form market efficiency, which is an area which seems to cause difficulty for a number of students.

**Example 1**

A company has calculated the NPV of a new project as follows:

| **Present Values$'000** | |
|---|---|
| Sales revenue | 4,000 |
| Variable costs | (2,000) |
| Fixed costs | (500) |
| Taxation at 20% | (300) |
| Initial outlay | (1,000) |
| NPV | 200 |

**What is the sensitivity of the project decision to a change in sales volume (to the nearest 0.1%)?**

The correct answer is 12.5%.

The sensitivity is calculated by dividing the net present value of the project by the present value of the post-tax contribution. The values in the table above are already given as present values and the post-tax contribution (in $'000) is as follows:

(4,000 – 2,000) x (1 – 0.2) = 1,600

Sensitivity = 200/1,600 x 100 = 12.5%

**Example 2**

**Which TWO of the following would be evidence of strong form market efficiency?**

A The lack of regulation on use of private information (insider dealing)
B Inability to consistently outperform the market and make abnormal gains
C Immediate share price reaction to company announcements to the market
D Regulation to ensure quick and timely public announcement of information

The correct answers are A and B.
In a strong form efficient market, insider dealing regulations would not be necessary as all private information is reflected in the share price anyway.

The market can still be outperformed by individual investors, but only by luck and not consistently.

Share prices will not react to the public announcement as the private information will already be known as the share price would react to the initial decision instead.

There would be no need for quick announcement as the information will already be known and reflected in the share price.

## Section B

Similarly to Section A, questions can come from any area of the syllabus, reinforcing the need for candidates to study the whole syllabus.

### General comments

Candidates should read the question carefully and follow the instructions on how to answer the question, for example if a question asks the candidate to select two correct statements, then marks can only be awarded if two statements have been selected. There is no partial marking, so an answer which only selects one statement will be awarded no marks. A candidate who selects three statements will also receive no marks.

In addition, when answering a number entry question, candidates must ensure they are entering their answer in the correct format as stated in the requirement. If there is no format specified, answers may be given as an integer or to one or two decimal places. The exam system is configured to allow any correct answer under these formats to be awarded the available marks.

Issues that were noted under specific syllabus areas are as set out below.

### Working capital

A number of candidates made errors relating to techniques for managing foreign accounts receivable and how to reduce the risks associated with this.

There were also a number of candidates who appeared to suffer from confusion over whether certain points were benefits of centralised treasury management or of decentralised treasury management.

### Business finance

Some issues were noted in questions relating to dividend policy. In particular some candidates had problems in applying practical considerations to a given scenario and what it is in a change in dividend policy which may affect share price.

### Business valuation

Price earnings ratio questions caused difficulties for some candidates, one particular recurring issue is that candidates need to use profit after tax and preference dividends, before applying a price earnings multiple to come to the final valuation.

### Risk management

It continues to be the case that candidates are not strong on questions which feature derivatives. One specific example in this session seemed to be not understanding how an interest collar would be constructed.

A further area of confusion appears to be students not fully understanding the terms appreciating and depreciating in terms of foreign currency exchange rates.

A further point causing problems in this area is that in order to reduce risk, foreign currency receipts and payments occurring on the same day should be netted off the minimise the exposure, before undertaking any further hedging techniques.

**Section C**

One of the main issues arising from candidates' responses to Section C questions is that candidates continue to perform better on calculation-based questions than on discussion questions. Responses to part questions requiring explanation or discussion are often too brief and/or poorly expressed and/or fail to address the requirement in a sufficient manner.

Section C of the examination is where candidates are required to have deeper knowledge of topics. Whilst there were many reasonable attempts at most parts of questions, there were too many candidates where responses to discursive questions displayed little or no knowledge, even to the extent that there are numerous instances of a 'No Response' to a part question, which can in some cases be worth ten marks.

As previously stated, the CBE exam delivery model means that candidates do not all receive the same set of questions. This means that trying to predict the questions in advance ('spotting') is at best, a waste of time, at worst, a dangerous tactic.

It is worth restating in this report that requirements must be read carefully and answered directly. Candidates should avoid the temptation to write all that they know about the topic and/or to try to answer the question they would have preferred. Instead, they should focus not only on the requirement asked of them, but use the scenario provided. Questions will often make reference to the company in the scenario e.g. 'Discuss reasons why XYZ Co should....'. This is clear guidance that it is expected of candidates to refer to the company's circumstances.

At this diet, some candidates failed to score marks where a recommendation and/or a comment was required on figures calculated. This is likely to be just one or two marks per part question, but could prove critical when it comes to a candidate's final score. For instance, if the requirement is to calculate cost and benefits of mutually exclusive options and comment on your findings, then a comment based on the outcome of your calculations should be provided but should amount to more than just one to two words, such that saying 'Option A should be chosen' should be supported by a justification as to why this is the case.

Finally in terms of general comments about Section C, it is worth restating that, if asked to 'discuss.....' factors/benefits/reasons, it is not enough to simply list a few words. If, in a part question, six marks are available to discuss three factors, then it is quite clear that each factor discussed is worth up to two marks. In such an example, a list of three brief, unexplained, points is unlikely to gain any marks.

Candidates at this diet were presented with Section C questions drawn mainly from the areas of:

- Management of inventories, accounts receivable, accounts payable and cash
- Determining working capital needs and funding strategies
- Investment appraisal techniques

- Allowing for inflation and taxation in Discounted Cash Flow (DCF)
- Adjusting for risk and uncertainty in investment appraisal
- Specific investment decisions
- Estimating the cost of capital
- Sources of finance and their relative costs

**Management of inventories, accounts receivable, accounts payable and cash**

This part of the Financial Management syllabus includes an outcome requiring candidates to discuss, apply and evaluate the use of relevant techniques in managing accounts receivable, including using factoring and invoice discounting.

At this diet, candidates were asked to calculate the costs and benefits of two factoring options and comment on their findings from analysing the differing options.

There were many good responses here, with lots of candidates scoring most of the marks.

That said, the most common error was a failure to fully understand the impact of an offer by a factoring company to advance a percentage of credit sales at a given interest rate. Such an advance will bring about an incremental change in the financing cost of trade receivables, rather than it being a wholly additional financing cost, since trade receivables would have already required financing.

Candidates need to take greater care in the presentation of their answers in computational questions such as this, given that some calculations require multiplying several component parts. Workings should be shown. Furthermore, there was evidence of confusion in distinguishing between revenue and capital items, for example calculating financing costs based upon sales revenue and not trade receivables or, by contrast, computing the factor's fees on trade receivables and not credit sales revenue.

Disappointingly, despite being asked to comment on the findings, responses here were often brief and sometimes missing, thereby relatively straightforward marks, for commenting on calculations already performed, were often not scored.

Candidates were also asked to discuss the reasons why the company in the scenario may benefit from the services offered by the factoring company. Responses were often too brief here; short bullet points, comprising just two to three words each, are not a discussion. There needs to be more focus on the verb used in the requirement (e.g. 'Discuss') and refinement of the art of reading the question is needed.

There were two main weaknesses in responses to this part question:

- Reasons given for using a factoring company were often simply a restatement of the costs and benefits calculated in the earlier part questions. The requirement specifically precluded this;
- The absence of relating the reasons to the company in the scenario i.e. the requirement asked why the given company may benefit from the services offered by the factoring company. Too often responses simply listed general reasons why factoring is beneficial without placing them in context.

**Determining working capital needs and funding strategies**

One part question at this diet required candidates to discuss factors that determine working capital investment levels. Whilst there were isolated good responses, overall this was rather unsatisfactorily executed.

Many answers gained very few marks because the discussion offered was not linked to the question requirement. Some answers were too brief for the marks available, often just a word or two was given per

factor. This is insufficient since if there are six marks available for three factors, then it is logical to deduce that two marks are available for each factor. Without discussion, no link was established between brief responses and the question requirement.

In too many cases, candidates lacked knowledge of the relevant part of the Financial Management Syllabus in relation to working capital investment policies, with discussions ensuing about elements of working capital without relating their answers to the question requirement. Others confused working capital investment policy with working capital financing policy. Some answers thought that accounting ratios, such as current ratio or quick ratio, were 'factors that determine the level of investment in working capital'

As happens too often, some answers related to questions which candidates would have liked to have been asked about working capital management, rather than to the actual part question asked in the examination.

**Investment appraisal techniques and allowing for inflation and taxation in DCF**

Candidates are, in general, continuing to do well on investment appraisal questions requiring calculations of the net present value (NPV). Many candidates score good marks here, often full marks.

Some of the errors mentioned in previous reports are reducing in quantity, but there are responses where the following mistakes are still being made:

- Placing the terminal value in the incorrect year or not including it at all;
- Inflating relevant cash flows incorrectly;
- Not placing tax-related cash flows in the correct time period, often by failing to defer them by one time period when the tax is paid one year in arrears;
- Omitting the tax-related cash flows in the final year, when they are payable one year in arrears;
- Not justifying financial acceptability comments by failing to refer to the decision rules relevant to the techniques, or indeed not including a comment at all, despite the requirement asking for one.

Some responses indicated that candidates did not know how to convert a given before-tax cost of capital into an after-tax cost of capital or indeed that this was needed at all.

One question contained a requirement to discuss the superiority of DCF methods over non-DCF methods. Whilst there was high levels of awareness of the issues of time value of money and consideration of the whole project, the extent of the discussion offered by some candidates was, once again, too brief. Common errors in candidates' responses included:

- Not offering a comparison;
- Failing to recognise that Internal rate of Return (IRR) is a DCF method
- Comparing NPV and IRR specifically, when requirement was for DCF versus non-DCF

Additionally, the presentation of answers here, as in many responses to discursive part questions, leaves something to be desired. Examples include:

- Not using the correct terminology for the time value of money;
- The writing of long sentences which are lacking in appropriate punctuation and;
- Typographical errors,

all of which lead to the impression of poor organisation of answers to questions.

Another question at this diet had a requirement that involved a critical discussion of the relative merits of NPV and IRR. Most answers gained very few marks because they did not adopt a comparative approach to answering the question requirement, for example, by making a statement about NPV without referring to IRR and vice versa, and hence not discussing the superiority of NPV over IRR.

Furthermore some responses:

- Could not gain full marks because they offered fewer than the number of reasons required by the question;
- Incorrectly stated that IRR is inferior to NPV because IRR ignores the time value of money;
- Were expressed only too briefly and in terms that were too general such as quick, easy, simple to understand.

Good answers were able to consider the NPV in terms of its impact on shareholder wealth, how non-conventional cash flows lead to multiple IRRs and also how the IRR method can rank mutually-exclusive projects in a different order to the NPV method, in a few cases explaining that this is due to the reinvestment assumption of the IRR method.

**Adjusting for risk and uncertainty in investment appraisal**

In respect to this area of the Financial Management syllabus, candidates were tested on their ability to discuss the difference between risk and uncertainty in relation to probabilities and project life, apply sensitivity analysis to investment projects and discuss the usefulness of sensitivity analysis in assisting investment decisions, and apply probability analysis to investment projects and discuss the usefulness of probability analysis in assisting investment decisions. Overall, this was not done well.

As in the question Vyxyn Co (March/June 2017 sample questions), candidates were asked to discuss the difference between risk and uncertainty for three marks. Responses here were often too brief with a typical response being in the form of just a few words or bullet points, which stated only that risk can be quantified but not uncertainty (or similar wording). The suggested solution to part (a) of Vyxyn Co gives clear guidance as to the type of response which would attract three marks.

As has been reported in previous Examiner's Reports, when asked to perform a sensitivity analysis calculation, the basic structure of the percentage computation is usually reproduced and performed by prepared candidates, but far too many candidates fail to take into account the tax effects of a change in a variable such as sales volume or contribution per unit. Moreover, some candidates ignore the need to look at the sensitivity computation in present value terms.

When asked to perform sensitivity analysis on the discount rate, computation of the IRR was usually well executed but there were issues when using the IRR to calculate discount rate sensitivity. The difference between the calculated IRR figure and the company's discount rate was sometimes shown as the discount rate sensitivity and occasionally the incorrect 'base' was chosen from which to calculate the percentage movement.

Whilst sensitivity analysis can be often be explained in a fundamental way by candidates, such as via a description of the formula, a requirement to 'discuss' comments provided in the scenario yielded disappointing answers. The provision of such information in the scenario should prove the basis upon which an answer can be prepared and presented.

This area of the syllabus also includes a requirement for candidates to be able to discuss the usefulness of probability analysis in assisting investment decisions. At this diet, one question contained a requirement to compare and contrast sensitivity and probability analysis in situations where there is more than one possible outcome. Candidates' responses were of variable quality and once again, a number of answers were often disorganised and poorly expressed, evidencing a lack of planning or maybe a lack of knowledge. Also, answers were often too short to have any chance of getting the marks on offer.

Furthermore, few students could clearly compare and contrast the two methods. Instead, with respect to each method, many appeared to write all that they knew about sensitivity analysis and probability analysis. Whilst (very) basic definitions were quite frequent, deeper knowledge, such as commenting on the likelihood of outcomes or the usefulness of each method for decision making, was rare.

**Specific investment decisions**

Contained within this sub section of the Investment Appraisal area of the syllabus, it is expected that candidates are able to evaluate leasing and borrowing to buy using the before- and after-tax costs of debt, evaluate asset replacement decisions using equivalent annual cost (EAC) and equivalent annual benefit (EAB), and to discuss the reasons for capital rationing. Question at this diet tested candidates in this sub section of the syllabus.

In questions requiring a 'leasing versus borrowing to purchase' choice, there were some very good complete answers. By contrast, there were fundamental errors being made which displayed a lack of understanding of the very nature of discounted cash flow. The most startling error, seen far too often, was the inclusion of interest payments within the computation of net cash flow. The cost of capital being used to discount the cash flows incorporates the cost of the debt finance being used, and hence the inclusion of interest payments in the cash flow schedule means that such interest payments are effectively being double counted.

Further errors in computing the cost of leasing an asset included:

- Failing to discount cash flows correctly, if at all, largely by failing to recognise the cost of borrowing as the discount rate and hence either not using it or misusing it in the calculation. There were instances of using different discount rates for the two options as well as a failure to use an after-tax rate when asked for post-tax net present values;
- Treating lease rental payments as year-end cash flows and not, as the question stated, cash flows in advance;
- Including tax saving on lease rental payments as a cost;
- Mistiming tax savings on lease rental payments;
- Including Tax Allowable Depreciation (TAD) benefits for a leased asset.

Further errors in computing the cost of purchasing an asset via a loan included:

- Including interest on the bank loan, as discussed above;

- Omitting the purchase cost or mistreatment of this cost such as putting the bank loan at end of year 4 or dividing the loan into four equal annual amounts of 'loan income' (sic);
- Omitting tax saving on service costs or showing service cost tax savings as an outflow;
- Showing scrap value as an outflow;
- Calculating TAD on a straight-line basis;
- Using the tax rate as the TAD% and vice versa.

In response to a related requirement asking for a discussion as to whether the leasing or purchasing option should be chosen, answers were in many cases too brief to justify the marks on offer, and failed to recognise the factors, other than the comparative NPVs, which should be taken into consideration. That said, some candidates advised rejection of both options on the grounds that they produced negative NPVs, when, in fact, it was financing options that were being evaluated.

Candidates presented with one question in this area also had to make a judgement as to the correct replacement interval for an asset, thereby involving the computation of the EAC for two different replacement cycles. To the credit of candidates, there were many fully correct answers here.

The common error here was a failure to know how to arrive at an EAC, with the division of NPV simply by the number of years being an often seen mistake, as well as a lack of appreciation of the role of annuity factors.

As has been discussed in respect of other requirements, a mark could have been scored by making a relatively straightforward recommendation. This was disappointingly missed by some candidates.

In a part question requiring a discussion of the reasons why the company in the scenario may be limited in terms of funds available for investment in new projects, too many candidates failed to recognise this as the issue of capital rationing and hence little understanding was displayed here. There were cases where candidates were unsure as to whether they were discussing internal or external limitations on funding, and hence could not properly distinguish between the soft and hard capital rationing faced by the company in question. More positively, candidates who were aware of capital rationing were able to gain full marks here.

**Estimating the cost of capital**

At this diet, questions tested candidates' ability to estimate the cost of equity including an explanation and discussion of systematic and unsystematic risk, and also an application of the capital asset pricing model (CAPM) and its assumptions.

Most candidates could use the basic CAPM equation to compute both a company and a project-specific cost of equity, but only some could correctly perform all of the necessary steps to arrive at the correct equity beta, namely use a proxy company's beta, and to degear it and regear it using the correct values for the respective companies' debt and equity components. Whilst some candidates scored full marks here, in too many cases the aforementioned process was missed out altogether. This is fundamental knowledge in the Business Finance section of the syllabus.

Common errors in performing this computation of a project specific cost of equity included:

- Unnecessary calculations of a WACC;
- Using book values of debt and equity when adjusting the beta factor;

- Using retained earnings in the total value of equity;
- Not considering the bank loan as a part of the total debt;
- Not using the after-tax value of debt.

Candidates were asked to consider why a project specific cost of equity needed to be used. Answers here were often hidden amongst quite a generic discussion about risk, but rarely about why this leads to a compensatory, higher cost of equity. Responses indicating that using an incorrect cost of capital would lead to a misstatement of a project's NPV, with the potential for an incorrect decision being made as a result, were rare.

One requirement at this diet asked candidates to explain and discuss the relationship between systematic and unsystematic risk. Responses here were mixed and often not in enough detail for the marks on offer. Some candidates offered confused explanations of the definitions of these types of risk and discussion of portfolio diversification was often missed or too scant to attract the marks available.

In addressing a requirement to discuss the assumptions made by the CAPM, once again the discussions offered by candidates were, in general, too light in content, with only a minority mentioning borrowing and lending at the risk free rate or the single-period transaction horizon at all.

**Sources of finance and their relative costs**

Questions at this diet also tested this sub-section of the Business Finance area of the syllabus, requiring candidates to assess the impact of sources of finance on financial position, financial risk and shareholder wealth using appropriate measures, describe the relative risk-return relationship and the relative costs of equity and debt, and to identify and discuss the problem of high levels of gearing.

The first of these areas was tested via a requirement to evaluate as to whether debt (via loan notes) or equity (via a rights issue) should be used to finance an expansion. This is an area that has been tested before (see Tin Co from the March/June 2018 sample questions). Also, the question KQK Co from the September/ December 2015 sample questions is worth revisiting.

Calculations performed involving the change in profit levels, financing costs and Earnings Per Share (EPS) of the respective financing methods were usually done well, with minimal errors. Less well done was the effect on the market share price and subsequent capital gain of the respective financing methods; in many cases, this was just not done at all. Also, this is another area where a recommendation would be an appropriate conclusion to an evaluation, but this was often missed out by candidates and another mark was not scored where it could and should be.

In response to a part question requiring a discussion about the risk-return relationship and how using both debt and equity finance affect the financing costs of the company in question, candidates could answer adequately only in very general terms. Most candidates made little or no reference to the specific types of finance used by the company described in the scenario, despite the requirement specifically asking for a discussion of how the financing costs of the company are affected by both debt and equity.

Once again, candidates need to both read the requirement and consider the number of marks on offer, and then judge the depth to which they should discuss the matter in hand. To reiterate, two or three short bullet points is not a discussion worthy of much credit in terms of marks.

Another requirement at this diet asked candidates to discuss the problems of high levels of gearing for the company described in the question. Most candidates gained reasonable marks here, with better answers using information from within the scenario to illustrate the problems. Responses that weren't so good were either too brief to qualify as a discussion or mentioned the problems of high levels of gearing in general terms rather than relating them to the company in the scenario.

Some candidates chose to use this part question to display their knowledge of capital structure theories such as the views of Miller and Modigliani, which was not asked for and so could only gain some marks in so far as it related to the problems of high gearing such as the effect on the costs of both debt and equity.

**Spreadsheet and Word Processing Technique**

There continues to be a rise in the extent and quality to which spreadsheet functionality is used by CBE candidates. In some cases, numerical responses were beautifully presented, professionally constructed and clearly labelled, with workings showing the build up to final figures.

That said, candidates should continue to recognise the importance of care and precision in the use of spreadsheets. For example, where text is entered into a cell, the presentation should be as good as it would be in a professional work environment and that it is good practice for their work to be presented in a way that can be easily read and understood i.e. it should be clearly visible without the need for markers to manipulate the cell.

It is perfectly acceptable to use cell formulae to perform computations, but care must continue to be taken in entering formulae in the spreadsheet. For instance, when using the sum formula, care must be taken to add the figures correctly. Errors here include the summation of too many or too few items yielding incorrect totals and sub totals. Also, using spreadsheet functionality to perform an internal rate of return calculation necessitates the selection of the correct net cash flows.

Markers can see the formula in a cell and hence apply the own-figure rule where appropriate. However, the own-figure rule cannot be applied to figures, rather than formulae, placed in spreadsheet cells with no supporting calculations.

It is worth re-emphasising that the same principles apply to calculations in CBE examinations as in PBE ones, namely that workings and supporting calculations must be shown and clearly labelled in order for 'method marks' to be awarded.

Regarding word processed answers, candidates should also respond to requirements here as they would be expected to do in the professional work environment. The use of a computer does not remove candidates' responsibility to prepare answers in this manner.

Furthermore, CBE candidates should be guided by the use of the designated spaces provided for some discursive responses. For example, requirements asking to 'Discuss three problems' will, in the CBE environment, ask candidates to respond in three separate 'boxes'. This should help candidates focus on providing the correct number of 'problems' or 'reasons' or whatever is being asked for.

**Guidance and Learning Support resources to help you succeed in your exam**

Preparing for the Financial Management exam may appear daunting but there are many resources available to help you. There are many technical articles available on the topics in this report. In addition all the past exams referred to, and more, are available for your use. You should refer to these throughout your studies.

Please make sure that you visit the ACCA's website and look at everything available to you. There are also plenty of support materials to help you feel confident about taking your exams on CBE.

http://www.accaglobal.com/uk/en/student/exam-support-resources/fundamentals-exams-study-resources/f9.html